

ABSTRACT TO THE DISCLOSURE

Jewelry, such as finger rings and earrings, which flash in synchronism with the wearer's heartbeat. A pulsed IR signal is directed into the wearer's tissue and a reflected or transmitted signal is monitored to determine when the wearer's heart beats at which time one or more light emitting sources in the jewelry flashes. The monitored signal is utilized to determine the wearer's heart rate. At least two light emitting sources are provided one of which flashes with each heart beat and the other flashes when the heart rate reaches or exceeds a predetermined range or increases faster than a predetermined rate. Preferred embodiments include three visible LED's (red, green and blue) and a micro-processor which calculates pulse rate and causes the red LED to blink on each pulse, the green LED to blink on each pulse when the wearer's pulse rate is greater a first threshold and the blue LED to blink on each pulse when the wearer's pulse rate is greater than a second threshold corresponding to extreme excitement. These threshold values may correspond to increased heart rates of typical persons engaged in exercise and love-making. The monitor may also be self calibrating to adjust the thresholds based on measurements of the wearer's heart rate over extended periods which would include periods of rest as well as periods of exertion or excitement. Other preferred embodiments vary the brightness of the LED's depending on the estimated blood pressure that also increases by about the same degree as pulse rate.